Cable confusion unravelled?

NEVER AFRAID TO TACKLE THE TRICKIEST – AND MOST CONTENTIOUS – OF HI-FI QUESTIONS, MARTIN COLLOMS HERE GETS TO GRIPS WITH A SELECTION OF LOUDSPEAKER AND INTERCONNECT CABLES FROM THE CHORD COMPANY, KIMBER KABLE, QED, TOWNSHEND AUDIO AND VERTERE

Audio signal cables, or indeed all cables including audio network and power cords, may have an influence on sound quality, but this remains a contentious subject. Whether that influence is significant, even audible, will depend on a host of factors, from the acuity and specific interest of the end user, to the quality of the set-up, whether there is a difference at all, and to a degree the sound quality both of the components of the audio system and the music sources involved.

Take the case of a 'lo fi' music centre, which generally comes with all required components including loudspeaker cables. Built to a price, all parts will have been most carefully costed to do the job required but no more. Often the audio components will be closely arranged on a convenient shelf, completing the installation.

Instead, for little money, such a 'music centre' could be placed on a low cost 'sound table' centrally in the intended stereo soundstage, and with the loudspeakers mounted on inexpensive 0.4 or 0.5 metre stands , e.g. from Argos or Amazon, spaced a metre to the left and to the right of the main system electronics. The resulting sound quality transformation is ear-opening for most observers, frequently doubling the level of musical satisfaction.

Then, assuming they're detachable, swapping out the supplied speaker cables would add a little extra sound quality at this point – you could try 2x5m of industry rated QED classic 42-strand cable at just £10 (plus terminations), whereas the supplied generic cables will not be 'audio grade' and will likely be little better than the 8 strand proverbial 'bell wire'. Thus, we are introduced to audio cables.

The subject expands almost exponentially from this point – for context, variety, and cost of available audio cable products. Before going into any detail, let's consider the fundamental requirements, noting that almost any pair of insulated wire conductors will safely pass or conduct audio signals.

While you can always hear the music signals passed through any working cable on its way to headphones or loudspeakers, the inner construction details of that cable, the materials used and its physical design may subtly affect sound quality.

Classically trained engineers have frequently rejected the proposition that cables sound different and some still do hold that view, though I am now reasonably confident that the audio industry has largely proven them wrong. On safer ground, we could say that the music passing through different cables can sound subtly different, and in some cases better, and give greater pleasure than with others. Neither should characterising 'better' be a problem: the improvements could encompass firmer and more tuneful bass, richer detail in the midrange, purer, better defined highs, crisper stereo image focus. Then, more contentiously, there's the matter of more satisfying rhythms related to tighter instrumental timing from musicians, also connected with the perception of an upbeat pace from the performers.

With such gains there may also be subjective characterisations of sharper focus or localisation, better definition for the percussive edges to sounds, also deeper, wider, and better focused stereo imaging, more natural timbres – you see, there's much to talk about.

Gains, even if not game-changing

Rarely are cable differences game-changing, but quality gains are there to be had. We might just as well take the opportunities presented to us. However, realising that advantage can be problematic. Generic raw cable is made in the tens of miles is surprisingly inexpensive, and it does much of the job required well enough.

Going a stage better suggests a more specialised cable design for purpose, requiring theory, experiment, and frequently costly prototypes: then trial production runs of relatively small quantities are undertaken where many cable prototypes may well be discarded. Shorts runs of specialist cable are expensive to set up, this latter stage may be many times the cost of materials, and thus the final per metre result for retail may look rather expensive for the material content concerned. That is the price we must pay for better sound quality.

Industrial 'trade' cable producers will occasionally have an inexpensive 'generic' cable in their range